### **REMARKS**

Claims 1-24, 37-39,44-46, 67, 90-93, 104, 121 and 134-142 are canceled herewith.

The text of canceled claim 50 is no longer shown in the claim listing. The Examiner's attention to detail in this regard is appreciated. The subject matter of claim 50 has been incorporated into independent claim 47.

Claims 1-142 were objected to as including trademarks and/or trade names.

Reconsideration and withdrawal of these objections are respectfully requested.

A brief survey of issued patents was conducted on September 22, 2008, to determine the number of <u>patents issued by the United States Patent and Trademark Office</u> that contained the phrase "Microsoft Windows" in the claims, and found the following:

Results of Search in US Patent Collection db for:

ACLM/"Microsoft Windows": 109 patents.

Hits 1 through 50 out of 109

PAT. NO. Title

- 1 7,424,509 T System and method for printing from a web application
- 2 7,403,566 T System, computer program product, and method for transmitting compressed screen images from one computer to another or many computers
- 3 7.386,403 T Method and system for charging management
- 4 7.383.228 T Method and system for preventing unauthorized rerecording of multimedia content
- 5 7,369,864 T Electronic short messaging and advertising method and means
- 6 7,365,870 T Methods and systems for page-independent spool file face-up emulation
- 7 7.360,072 T iSCSI system OS boot configuration modification
- 8 7.337.330 T Universal game download system for legacy gaming machines
- 9 7,319,533 T System for face-up printing from a duplex printer
- 10 7,313,526 T Speech recognition using selectable recognition modes
- 11 7.269,160 T Voice over internet call center integration
- 12 7.260,115 T System and method of ordering the transmission of data packets in a radio system

- 13 7.242,945 T Method, apparatus, and system for designing and planning a shared satellite communications network
- 14 7.236.243 T Hand-held spectrometer
- 15 7,231,460 T System and method for leveraging networked computers to view windows based files on Linux platforms
- 16 7,225,130 T Methods, systems, and programming for performing speech recognition
- 17 7,216,251 T Computer imaging recovery without a working partition or a secondary medium
- 18 7.183.947 T System and method of utilizing wireless remote device for communication, activation and control of various defense systems for countering hostile activity aboard an airplane
- 19 7,181,738 T Running ramdisk-based Microsoft Windows 95/98/ME
- 20 7,170,498 **T** Computer system provided with hotkeys
- 21 7,165,114 T Web streaming in a messaging system
- 22 7,149,681 T Method, system and program product for resolving word ambiguity in text language translation
- 23 7.137.117 T Dynamically variable idle time thread scheduling
- 24 7.136.728 T Computerized wheel alignment system with improved stability and serviceability
- 25 7,130,888 T Method and apparatus for controlling a computer over a TCP/IP protocol network
- 26 7,127.602 **T** iSCSI computer boot system and method
- 27 7,117,251 T Method and system of asymmetric satellite communications for local area networks
- 28 7,116,764 T Network interface unit having an embedded services processor
- 29 7.103.064 T Method and apparatus for shared I/O in a load/store fabric
- 30 7.093.267 T Hosting controls in a window via an interface for controlling the window
- 31 7,089,300 T Method and apparatus for administering the operating system of a net-booted environment
- 32 7.057.370 T Ultra-fast precision motor with X, Y and Theta motion and ultra-fast optical decoding and absolute position detector
- 33 7,028,019 T Method and system of managing software conflicts in computer system that receive, processing change information to determine which files and shared resources conflict with one another
- 34 7.024.580 T Markov model of availability for clustered systems
- 35 7,013,327 T Method and apparatus for computing within a wide area network
- 36 6.985.753 T Portable navigation and communication systems
- 37 <u>6.966.062</u> T <u>Method and apparatus for allocating use of an access device between host and guest operating systems</u>
- 38 6.944,757 T Method for allowing CD removal when booting embedded OS from a CD-ROM device

39 6,941,397 T Quick save system and protocol, monitor program and smart button firmware of the same 40 <u>6.934.912</u> T System and method for providing a history list of existing imaging compositions 41 6.931.523 T System and method for re-storing stored known-good computer configuration via a non-interactive user input device without re-booting the system 42 6.912.522 T System, method and computer program product for optimization and acceleration of data transport and processing 43 6,857,069 T Modified operating system boot sequence for iSCSI device support 44 6.854.119 T Method, apparatus and article of manufacture for tracking processes 45 6,842,823 T Methods and apparatus for persistent volatile computer memory 46 6.823,525 T Method for displaying single monitor applications on multiple monitors driven by a personal computer 47 6.778.990 T Dynamic component activation method using a relational database as the repository for registration information 48 6.763.458 T System and method for installing and servicing an operating system in a computer or information appliance

50 6,711,591 **T** Top-down control of multiple layer aggregation logical volume management

49 6.742.114 T Deputization in a distributed computing system

data and boot record

mand fully 59 more, for a total of 109 granted US patents granted between 1976 and the present (as recently as September 9, 2008) containing the trade mark/name "Microsoft Windows." Given the Office's own past and continuing willingness to include this phrase in issued patents, it is respectfully submitted that the phrase is not indefinite. Moreover, quite apart from the survey evidence above, it is respectfully submitted that "Microsoft Windows®" is not indefinite and accurately puts the public on notice of the scope of the claims. Far from being indefinite, "Microsoft Windows" is both definite and limiting, as it constrains the claimed operating system to being a "Microsoft Windows" operating system. The Office, from the evidence presented above, is not averse to allowing a great many patent application claims containing the phrase "Microsoft Windows" and should also feel comfortable in allowing the remaining pending claims containing a

reference to Microsoft Windows® on that basis. Reconsideration and withdrawal of the objections to the claims are, therefore, respectfully requested.

Claims 1-142 were rejected under §101 as allegedly lacking patentable utility. Reconsideration and withdrawal of these rejections are respectfully requested, for the following reasons.

Section of the 706.03 of the MPEP, the USPTO's own guide for patent Examiners, addresses the issue of rejections under §101:

# 706.03(a) Rejections Under 35 U.S.C. 101 [R-5] - 700 Examination of Applications

706.03(a) Rejections Under 35 U.S.C. 101 [R-5]

#### I. SUBJECT MATTER ELIGIBILITY

Patents are not granted for all new and useful inventions and discoveries. The subject matter of the invention or discovery must come within the boundaries set forth by 35 U.S.C. 101, which permits patents to be granted only for "any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof."

The term "process" as defined in <u>35 U.S.C. 100</u>, means process, art or method, and includes a new use of a known process, machine, manufacture, composition of matter, or material.

See <u>MPEP § 2105</u> for \*\*>patent eligibility of living subject matter< and <u>MPEP</u> § 2106 \*\*>for guidelines pertaining to subject matter eligibility in general.<

Decisions have determined the limits of the statutory classes. Examples of subject matter not patentable under the statute follow:

## A. Printed Matter

For example, a mere arrangement of printed matter, though seemingly a "manufacture," is rejected as not being within the statutory classes. See *In re Miller*, 418 F.2d 1392, 164 USPQ 46 (CCPA 1969); *Ex parte Gwinn*, 112 USPQ 439 (Bd. App. 1955); and *In re Jones*, 373 F.2d 1007, 153 USPQ 77 (CCPA 1967).

### B. Naturally Occurring Article

Similarly, a thing occurring in nature, which is substantially unaltered, is not a "manufacture." A shrimp with the head and digestive tract removed is an example. Ex parte Grayson, 51 USPQ 413 (Bd. App. 1941).

#### C. Scientific Principle

A scientific principle, divorced from any tangible structure, can be rejected as not within the statutory classes. O''Reilly v. Morse, 56 U.S. (15 How.) 62 (1854).

This subject matter is further limited by the Atomic Energy Act explained in MPEP § 706.03(6).

#### II. UTILITY

A rejection on the ground of lack of utility includes the more specific grounds of inoperativeness, involving perpetual motion. A rejection under 35 U.S.C. 101 for lack of utility should not be based on grounds that the invention is frivolous, fraudulent or against public policy. See Juicy Whip Inc. v. Orange Bang Inc., 185 F.3d 1364, 1367-68, 51 USPQ2d 1700, 1702-03 (Fed. Cir. 1999) ("[Y]ears ago courts invalidated patents on gambling devices on the ground that they were immoral..., but that is no longer the law...Congress never intended that the patent laws should displace the police powers of the States, meaning by that term those powers by which the health, good order, peace and general welfare of the community are promoted...we find no basis in section 101 to hold that inventions can be ruled unpatentable for lack of utility simply because they have the capacity to fool some members of the public."). The statutory basis for this rejection is 35 U.S.C. 101. See MPEP § 2107.01 - § 2107.03 for legal precedent governing the utility requirement.

Moreover, the Revised Interim Utility Guidelines, the USPTO's own guidelines for rejections of this type, available at <a href="https://www.uspto.gov/web/inenu/utility:pdf">www.uspto.gov/web/inenu/utility:pdf</a> state:

# SYNOPSIS OF APPLICATION OF THE REVISED INTERIM UTILITY GUIDELINES

It is assumed at this point in the analysis that the specification has been reviewed and an appropriate search of the claimed subject matter has been conducted. It is also assumed that some "utility" is disclosed in the specification or is recognized to be well-established in the art. The examiner should determine whether any asserted utility is specific and substantial, and if so, determine whether such asserted utility is credible. In determining credibility the examiner should consider whether or not there currently are similar or equivalent materials and/or procedures available for achieving that utility. If there are, the utility is credible and no rejection under 35 U.S.C. § 101 should be made. (Emphasis mine)

The terms "credible utility", "specific utility", "substantial utility" and "credible utility" are also defined in this document. These definitions are excerpted below:

**Definitions** 

"Credible utility" - Where an applicant has specifically asserted that an invention has a particular utility, that assertion cannot simply be dismissed by Office personnel as being "wrong". Rather, Office personnel must determine if the assertion of utility is credible (i.e., whether the assertion of utility is believable to a person of ordinary skill in the art based on the totality of evidence and reasoning provided). An assertion is credible unless (A) the logic underlying the assertion is seriously flawed, or (B) the facts upon which the assertion is based are inconsistent with the logic underlying the assertion. Credibility as used in this context refers to the reliability of the statement based on the logic and facts that are offered by the applicant to support the assertion of utility. A credible utility is assessed from the standpoint of whether a person of ordinary skill in the art would accept that the recited or disclosed invention is currently available for such use. For example, no perpetual motion machines would be considered to be currently available. However, nucleic acids could be used as probes, chromosome markers, or forensic or diagnostic markers. Therefore, the credibility of such an assertion would not be questioned, although such a use might fail the specific and substantial tests (see below).

"Specific utility" – A utility that is specific to the subject matter claimed. This contrasts with a general utility that would be applicable to the broad class of the invention ....

"Substantial utility" - a utility that defines a "real world" use...

It is noted that the term "patentable utility", used as one of the bases for rejecting the claims in the outstanding Office Action, is nowhere to be found in the guidelines. Moreover, the Office has stated, on page 3 of the outstanding Office Action, that the claims do not "involve in any way an "inventive step" and that the claimed steps "require no inventive activity".

At the outset, it is respectfully submitted that "inventive step" is a standard utilized by the European Patent Office, among others, to reject claims based upon prior art, when a Novelty rejection cannot be made. Thus, whereas "inventive step" is a standard that may be most closely analogized to obviousness, it has no place in a rejection under 35 USC §101. The undersigned does not know what the Office means by "inventive activity", but is also of the opinion that such a standard is not proper in the context of a §101 rejection.

The appropriate standards are set forth above by the USPTO. Both in section 706.03 of the MPEP and in the Revised Interim Utility Guidelines, excerpted above.

According to Title 35, United States Code and the MPEP, patents may be granted for any "new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof.". It is respectfully submitted that the pending herein squarely fall within the rubric of "new and useful process, machine, manufacture". For example, claim 25 is

"A method for operating a gaming machine comprising the steps of:
running an operating system loaded in the gaming machine;
downloading at least one software module into the gaming machine;
checking ...

"

Certainly, a method of operating a gaming machine is a) a process, and b) a useful process, thereby placing this claim squarely within the Congressionally-mandated purview of subject matter that is appropriate for patents.

Claim 47 is a <u>method</u> for verifying gaming terminal software, which is also a useful process. The regulatory agencies charged with ensuring the proper operation of gaming devices would no doubt concur in this conclusion.

Claims 80 and 101 are claims defining gaming <u>machines</u>, which is a category that is properly classifiable as a "machine" and, therefore, at least potentially patentable under §101.

The methods and machines claimed herein are <u>not</u> a) Printed Matter, b) Naturally Occurring Article, c) a Scientific Principle and d) a Perpetual Motion Machine, which again point to a finding that the claims define subject matter that is appropriate for patents, under the Office's own guidelines (see SUBJECT MATTER ELIGIBILITY above)

Applying now the Revised Interim Utility Guidelines reproduced above yields the following. It is respectfully submitted that the claimed methods and gaming machines possess utility, and that the utility would be credible to a person of ordinary skill in the art. It is believed that the multi-billion dollar US gaming industry considers methods for operating gaming machines, methods for verifying gaming terminal software and gaming machines to be credibly useful, as such methods and devices drive the industry, are rooted in the technological arts and have far-reaching economic value and utility.

The interim guidelines also specify that a credible utility is assessed from the standpoint of whether a person of ordinary skill in the art would accept that the recited or disclosed invention is currently available for such use. In the present case, the methods and gaming machines are, indeed, currently available for use in the gaming industry, and are not confabulated "inventions" such as perpetual motion machines. As such, a credible utility is established herewith. The claimed utility, moreover, is specific (methods for operating gaming machines, methods for verifying gaming terminal software and gaming machines are not generalized methods and devices, but a) specific and b) substantial, as required by the Interim rules, as the uses of the claimed embodiments are not generalized but specifically set forth and well understood in the "real world" of the gaming industry.

The claims, therefore, define embodiments that are well within the Congressionally approved categories of inventions for which a patent may be granted. The Examiner's standards applied in the outstanding Office Action are not proper for a 101 rejection, as they relate more to European standards for art rejections. Within the context of a section 101 rejection, the standards applied by the Office are incorrect as a matter of law. Consequently, reconsideration and withdrawal of the 101 rejections of the claims are respectfully requested.

Claims 1-46, 80-100 and 135-142 were rejected as being anticipated or obvious over the England reference, 6,330,670. Reconsideration and withdrawal of these rejections are respectfully requested.

In the Office Action, the Examiner examined only claim 1, and applied only the recitations of claim 1 against the England reference. Thereafter, the Examiner states that "The remaining dependent claims are simply steps that a user can define in a Windows Operating System as far as setting restrictions goes on content that needs to be run by a software program. These settings are already available to the user since it is built in to the Windows Operating System ... There is no novelty or inventive step in any of the stated claims".

At the outset, it is respectfully submitted that "inventive step" is not the proper standard for obviousness in the United States.

The applicant, moreover, having paid the not-insubstantial fees for extra independent and dependent claims, was entitled to a full and complete examination of at least all of the independent claims, not just claim 1. The Office, by paraphrasing only the recitations of claim 1, has not met its initial burden of proof with respect to any and all claims whose recitations differ materially from those of claim 1. A full and complete examination of all claims presented is, therefore, respectfully requested, in a further non-final Office Action, should the Examiner contend that present amendment does not place the present application in condition for allowance.

The England et al. reference teaches digital rights management operating systems (DRMOS). England et al. teach that the DRMOS is configured to "check itself" by loading a first layer of the Operating Systems (the boot loader, which loads a boot block of the OS), which then

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checks each of the remaining components of the OS to determine whether they have been signed by a trusted source:

stage process. A securely booted computer runs a trusted program at startup. The trusted program loads an initial layer of the operating system and checks its integrity (by using a code signature or by other means) before allowing it to run. This layer will in turn load and check the succeeding layers. This proceeds all the way to loading trusted (signed) device drivers, and finally the trusted application(s).

This process is further detailed in England et al. at Column 11, beginning at line 39:

Shortly after a computer is turned on or is reset, a small program called a boot loader is executed by the CPU (block 301). The boot loader loads a boot block for a particular operating system. Code in the boot block then loads various drivers and other software components necessary for the operating system to function on the computer. The totality of the boot block and the loaded components make up the identity of the operating system.

For a DRMOS, that identity can be trusted only if the boot block and the loaded components are trusted. In the embodiments described herein, all components are signed by a trusted source and provided with a rights manager certificate. An exemplary embodiment of the rights manager certificate is described below in conjunction with FIG. 9.

The operating system checks the signature of a component before loading it (block 303). If the signature is valid (block 305), the component has not been compromised by someone attempting to circumvent the boot process and the process proceeds to check the level of trust assigned to the component (block 307). If the signature is not valid (or if there is no signature) but the component must be loaded (block 319), the operating system will not assume the identity of a DRMOS upon completion of the boot process as explained further below.

According to England et al., the DRMOS is configured to prevent untrusted access to DRM-secured data and to "renounce" its once trusted identity (stored in an internal CPU register) if caused to load an untrusted software component, as taught at Col. 12, lines 1-8:

the boot process. If the device requires the loading of an untrusted component after the boot process completes, a plug-and-play DRMOS must then "renounce" its trusted identity and terminate any executing trusted applications (block 323) before loading the component. The determination that an untrusted component must be loaded can be based on a system configuration parameter or on instructions from the user of the computer.

England et al. teach various methods for determining whether an application can be trusted, and all such methods appear to rely on the DRMOS checking the signature of the software component against a list of trusted providers (see Col. 13, lines 19-35), by maintaining a boot log (see Col. 13, beginning at line 36) or by manipulating cryptographic key pairs (see Col. 13, beginning at line 60) and the like.

However, nowhere do England et al. teach and/or suggest the subject matter of amended independent claims 25 and 80, namely:

running an operating system loaded in the gaming machine;

providing and installing a trusted verification driver in the gaming machine, the trusted verification driver being independent of the operating system;

performing a verification of components of the operating system against a trusted reference using the trusted verification driver and preventing further operation of the gaming machine when the verification of the components of the operating system fails;

downloading at least one software module into the gaming machine;

checking a code signature of at least one downloaded software module using a the trusted verification driver, and

authorizing execution of the downloaded software module in the gaming machine only if the downloaded software module is successfully verified by the trusted verification driver.

Specifically, England et al. do not teach or suggest providing or installing a trusted verification driver that is <u>independent of the operating system</u> and using the trusted verification driver to perform a verification of the operating system and to check to code signature of downloaded software modules or components. In England et al., the verification of the OS is performed... by the OS itself (!), and not by a trusted verification driver that is independent of the operating system. The claimed methods and gaming machines of claims 24 and 80, therefore, are clearly antithetical to the OS-centric DRMOS model espoused by England et al.

Independent claim 47 recites, as amended:

47. (Original) A method for verifying gaming terminal software, comprising the steps of:

installing at least one driver into the gaming machine;

blocking execution of an operating system of the gaming machine;

taking complete control of the gaming machine with the at least one driver;

verifying a legitimacy of all software and memory content in the gaming machine using the at least one driver;

relinquishing control of the gaming machine back to the operating system, and

authorizing the gaming machine to execute only software that is successfully verified.

Amended independent claim 101 includes similar recitations.

As characterized above, England et al. teach an OS-centric method for verifying gaming terminal software (OS and applications or other software components). That is, England et al.'s OS itself checks itself (through a phased OS loading procedure that includes a boot loader that checks the remaining components of the OS) and then checks any module that was loaded after the OS itself was loaded. Claims 47 and 101, in direct contrast, recite that the driver blocks the OS of the gaming machine (by disabling all interrupts, for example – see claims 49, 51 and 103, 105). Thereafter, the driver takes complete control of the gaming machine and verifies the legitimacy of all software and memory content in the gaming machine before relinquishing control of the gaming machine back to the operating system and authorizing execution of successfully verified software.

Moreover, independent claims 1 and 134 require that the provided driver carry out security verifications independently of the operating system and to take full control of the gaming machine, which is plainly antithetical to the OS-centric DRMOS of England et al. Such steps and functionality is also believed to be contrary to England et al, which teaches that the operating system itself maintains logs of trusted providers and checks itself through a boot loader process. England does not teach and/or suggest a) blocking execution of an operating system of a gaming

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machine; b) taking complete control of the gaming machine with the at least one driver; c) verifying a legitimacy of all software and memory content in the gaming machine using the at least one driver; or c) relinquishing control of the gaming machine back to the operating system, as claimed herein. Failing such teachings, it is respectfully submitted that the 102(b)/103(a) rejections

Applicants' attorney believes that all claims are allowable as incorporating allowable subject matter and that the present application is now in condition for an early allowance and passage to issue. If any unresolved issues remain, the Examiner is respectfully invited to contact the undersigned attorney of record at the telephone number indicated below, and whatever is required will be done at once.

Respectfully submitted,

Date: July 10, 2009

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be reconsidered and withdrawn. The same is, therefore, respectfully requested.

Alan W. Young Attorney for Applicants Registration No. 37,970

YOUNG LAW FIRM, P.C. 4370 Alpine Rd., Ste. 106 Portola Valley, CA 94028 Tel.: (650) 851-7210

Fax: (650) 851-7232